

Tuesday, May 26, 2015 12:43:44 PM

133087

Page 1

Accept

N900040100

Setup Start *NS1*

Revision ID:

Item Name: Spacer

Stop *NS2*

Start Date: 5/26/15

Start Qty: 4.00

4

Cust Item ID:**Required Date: 5/26/15****Req'd Qty: 4.00**

4

Customer:

Reference:

Approvals:

Process Plan: MLJ

Date: MAY 26 2015

Tooling:

Date:

Run Start *NR1*

QC:

Date:**SPC (Y/N):**

Date:

Stop
NR2

[illegible]

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____		DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐		AGAINST DEPARTMENT/PROCESS <table style="width:100%; border: none;"> <tr> <td style="border: none;">Skid-tube ☐</td> <td style="border: none;">Cross tube ☐</td> <td style="border: none;">Water Jet ☐</td> <td style="border: none;">Engineering ☐</td> </tr> <tr> <td style="border: none;">Machining ☐</td> <td style="border: none;">Small Fab ☐</td> <td style="border: none;">Prod. Eng. Coord. ☐</td> <td style="border: none;">Quality ☐</td> </tr> <tr> <td style="border: none;">Thermoforming ☐</td> <td style="border: none;">Finishing ☐</td> <td style="border: none;">Rec/Store/Packaging ☐</td> <td style="border: none;">Other ☐</td> </tr> <tr> <td style="border: none;">Large Fab ☐</td> <td style="border: none;">Composite ☐</td> <td style="border: none;">Supplier ☐</td> <td></td> </tr> </table>						Skid-tube ☐	Cross tube ☐	Water Jet ☐	Engineering ☐	Machining ☐	Small Fab ☐	Prod. Eng. Coord. ☐	Quality ☐	Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐	Large Fab ☐	Composite ☐	Supplier ☐																																																	
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Work Order ID 133087

Tuesday, May 26, 2015 12:43:44 PM

133087

Page 2

Item ID: D3259-5 Accept ***N900040100*** Setup Start ***NS1***
Revision ID: Stop ***NS2***
Item Name: Spacer
Start Date: 5/26/15 Start Qty: 4.00 ***4*** Cust Item ID:
Required Date: 5/26/15 Req'd Qty: 4.00 ***4*** Customer:
Reference:

Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____ Run Start ***NR1***
QC: _____ Date: _____ SPC (Y/N): _____ Date: _____ Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
120 *120* QC Quality Control	QC8- Inspect parts - second check Memo	0.00 0.00				4			DAS 05 9-89 15.6-3
130 *130* HandFinish Hand Finishing	Chemical Conversion Coat per QSI005 4.1 Memo	0.00 0.00				4	Ø		Jm15-6-3
140 *140* QC Quality Control	^{QC 7} QC8- Inspect Part Finish Memo	0.00 0.00				④			DAS 38 9-89 JUN 04 2015

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

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Work Order ID 133087

Tuesday, May 26, 2015 12:43:44 PM

133087

Page 3

Item ID: D3259-5

Accept

N900040100

Setup Start

NS1

Revision ID:

Stop

NS2

Item Name: Spacer

Start Date: 5/26/15

Start Qty: 4.00

4

Cust Item ID:

Required Date: 5/26/15

Req'd Qty: 4.00

4

Customer:

Reference:

Approvals:

Process Plan: _____

Date: _____

Tooling: _____

Date: _____

Run Start

NR1

QC: _____

Date: _____

SPC (Y/N): _____

Date: _____

Stop

NR2Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

150

Identify as per dwg & Stock Location: GA

0.00

150

Packaging

Memo

0.00

Packaging

LOCATION : GA

4

D3259-5
27

JUN 08 2015

160

QC21- Final Inspection - Work Order Release

0.00

160

QC

Memo

0.01

Quality Control

MCS

JUN 08 2015

MCS

JUN 08 2015

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____		DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐		AGAINST DEPARTMENT/PROCESS Skid-tube ☐ Machining ☐ Thermoforming ☐ Large Fab ☐ Cross tube ☐ Small Fab ☐ Finishing ☐ Composite ☐ Water Jet ☐ Prod. Eng. Coord. ☐ Rec/Store/Packaging ☐ Supplier ☐ Engineering ☐ Quality ☐ Other ☐					
Date :		Step #:		QTY Effective :			MRB (QSI042) Approval Completed By Lead hand / Supervisor Approval Verification QC / QA Coordinator Approval		
Description Work Order Deviation				Disposition					
Root Cause Environment ☐ Design ☐ Doc/Data ☐ Equip/Tooling ☐ Handling/Pre ☐ Material ☐ Internal Transport ☐ Tribal Knowledge ☐ LOA ☐ Substation ☐ Past Expiry Date ☐ Misidentified ☐ No Re-verification ☐ Operator ☐ Offset/Setup ☐ Supplier ☐ Training ☐ Use for Testing ☐ Poor Information ☐ Rushing ☐ Product Improvement ☐ Process Improvement ☐ Manufacturing Process ☐ Past Due ☐		FAULT CATEGORY Pressure/Forced ☐ Bending ☐ Centre Not Concentric ☐ Cracks ☐ Crimp/Kink/Ripple/Wave ☐ Cuffs ☐ Crushing ☐ Heat Treat ☐ Wave/Twist in Tube ☐ Marks/Chatter ☐ Temperature/Cure ☐ Set-up ☐ BOM/Route ☐ Broken/Damage/Defect ☐ Inspection Incomplete/Unqualified ☐ Contamination ☐ Countersink ☐ Cut Too Short ☐ Instructions Incomplete/Unclear ☐ Drill Holes ☐		Power Loss/Surge ☐ Folio/Program ☐ Grain ☐ Weld ☐ Wrong Stock Pulled ☐ Out of Sequence ☐ Off-set ☐ Mislabeled ☐ Fit/Function ☐ Misaligned/off center ☐ Positioned Wrong ☐ Outside Dimensions ☐ Over/Under tolerance ☐ Part Incorrect ☐ Part Lost/Missing ☐ Part Moved ☐ Drawing ☐ Finish ☐ Misread ☐ Turning Sequence ☐					
OTHER : ☐									

Picklist Print

Tuesday, May 26, 2015 12:43:43 PM

Work Order ID: 133087

133087

Parent Item: D3259-5

D3259-5

Parent Item Name: Spacer

Start Date: 5/26/15

Required Date: 5/26/15

Start Qty: 4.00

Required Qty: 4.00

Comments: IPP Rev:A New Issue 07-07-19 JLM Verified By:EC IPP REV
B:AS PER REV B 10-05-19 JLM VERIFIED BY:EC

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
M2024T3S.032		Purchased		No		100	sf	51.9060	1.388	5.844210			

M2024T3S 032

2024-T3 .032 sheet

**

6

Jm15-6-3

Location

Loc Qty

Loc Code

MAT022

51.906

M130497

51.906

130497

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____	DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐	AGAINST DEPARTMENT/PROCESS Skid-tube ☐ Machining ☐ Thermoforming ☐ Large Fab ☐ Cross tube ☐ Small Fab ☐ Finishing ☐ Composite ☐ Water Jet ☐ Prod. Eng. Coord. ☐ Rec/Store/Packaging ☐ Supplier ☐ Engineering ☐ Quality ☐ Other ☐			
Date :	Step #:	QTY Effective :		MRB (QSI042) Approval	
Description Work Order Deviation		Disposition		Completed By	
				Lead hand / Supervisor Approval Verification	
				QC / QA Coordinator Approval	
Root Cause		FAULT CATEGORY			
Environment ☐ Design ☐ Doc/Data ☐ Equip/Tooling ☐ Handling/Pre ☐ Material ☐ Internal Transport ☐ Tribal Knowledge ☐ LOA ☐ Substation ☐ Past Expiry Date ☐ Misidentified ☐	No Re-verification ☐ Operator ☐ Offset/Setup ☐ Supplier ☐ Training ☐ Use for Testing ☐ Poor Information ☐ Rushing ☐ Product Improvement ☐ Process Improvement ☐ Manufacturing Process ☐ Past Due ☐	Pressure/Forced ☐ Bending ☐ Centre Not Concentric ☐ Cracks ☐ Crimp/Kink/Ripple/Wave ☐ Cuffs ☐ Crushing ☐ Heat Treat ☐ Wave/Twist in Tube ☐ Marks/Chatter ☐	Temperature/Cure ☐ Set-up ☐ BOM/Route ☐ Broken/Damage/Defect ☐ Inspection Incomplete/Unqualified ☐ Contamination ☐ Countersink ☐ Cut Too Short ☐ Instructions Incomplete/Unclear ☐ Drill Holes ☐	Power Loss/Surge ☐ Folio/Program ☐ Grain ☐ Weld ☐ Wrong Stock Pulled ☐ Out of Sequence ☐ Off-set ☐ Misabeled ☐ Fit/Function ☐ Misaligned/off center ☐	Positioned Wrong ☐ Outside Dimensions ☐ Over/Under tolerance ☐ Part Incorrect ☐ Part Lost/Missing ☐ Part Moved ☐ Drawing ☐ Finish ☐ Misread ☐ Turning Sequence ☐
OTHER : ☐					

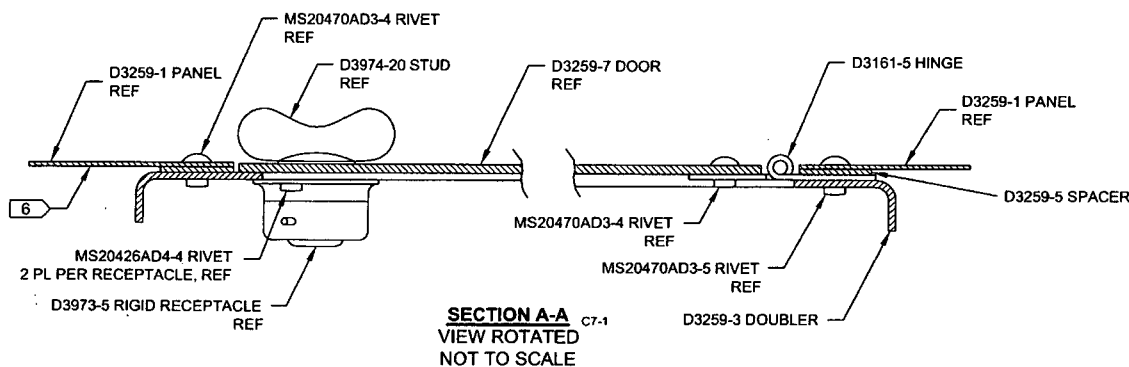
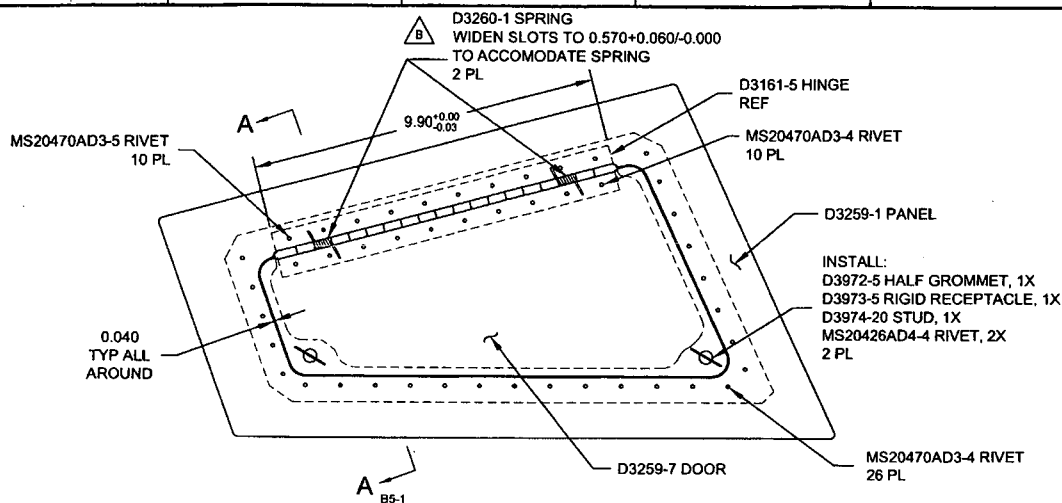
DART AEROSPACE LTD		Work Order:	133087
Description: Spacer		Part Number:	D3259-5
Inspection Dwg: D3259	Rev: B	Page 1 of 1	

FIRST ARTICLE INSPECTION CHECKLIST

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
9.000	+/-0.005	9.000"	-		✓	Jtmo?
1.000	+/-0.005	1.000"	-		✓	
5.000	+/-0.005	5.000"	-		✓	
12.000	+/-0.005	12.000"	-		T	
3.5000	+/-0.005	3.500"	-		✓	
0.875	+/-0.005	0.875"	-		✓	
0.260	+/-0.010	0.260"	-		✓	
R0.50	+/-0.030	0.50"	-		RG	
0.250	+/-0.010	0.250"	-		✓	
0.875	+/-0.005	0.875"	-		✓	
Ø0.098	+0.005/-0.000	0.099"	-		✓	
0.550	+/-0.010	0.550"	-		✓	
R0.50	+/-0.030	0.50"	-		RG	
10.062	+/-0.010	10.062"	-		✓	
R0.13	+/-0.030	0.13"	-		RG	
0.032 thick	+/-0.010	0.032"	-		✓	
0.130	+/-0.010	0.130"	-		✓	

Measured by:	Jm	Audited by:	DAS 05 9-89	Preliminary Approval:	
Date:	15-6-3	Date:	15.6.3	Date:	

Rev	Date	Change	Revised by	Approved
A	04.08.25	New Issue P/O D412-705-019	KJ/JLM	
B	10.06.07	Dwg Rev updated	KJ	



D3259-041 ACCESS PANEL ASSEMBLY

NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: NONE
- 6) IDENTIFICATION: IDENTIFY WITH P/N "D3259-041" AND B/N "BXXXXX" USING FINE POINT PERMANENT MARKER
- 7) WEIGHT: 1.2 lbs

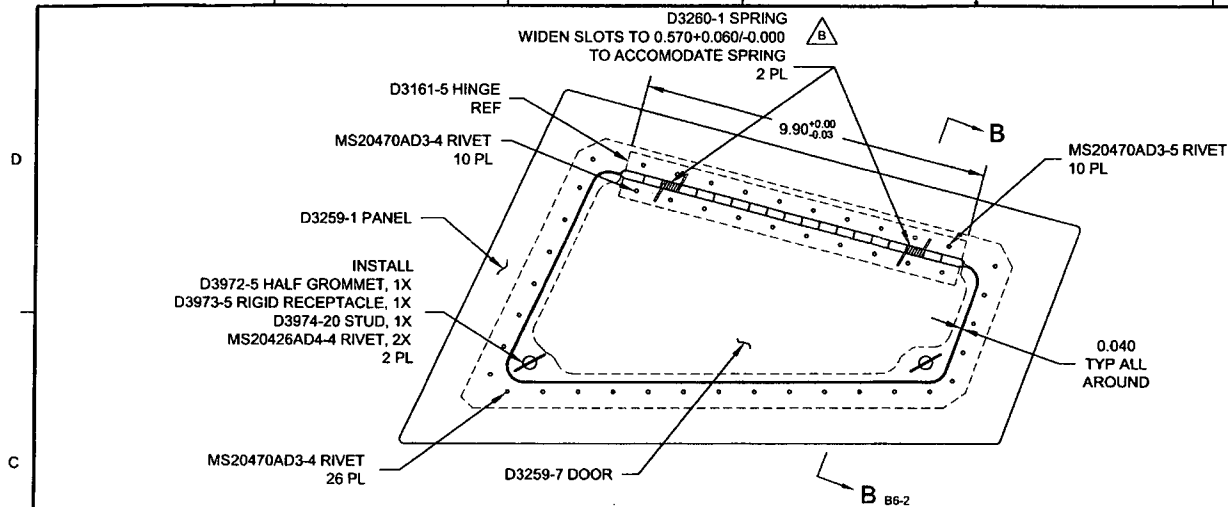
ITEM	QTY	PART NUMBER	DESCRIPTION
1	X	D3259-041	ACCESS PANEL ASSEMBLY
2	1	D3161-5	HINGE
3	1	D3259-1	PANEL
4	1	D3259-3	DOUBLER
5	1	D3259-5	SPACER
6	1	D3259-7	DOOR
7	2	D3260-1	SPRING
8	2	D3972-5	GROMMET, HALF, DZUS
9	2	D3973-5	RECEPTACLE, RIGID, DZUS
10	2	D3974-20	STUD, WING HEAD, 5/16 DZUS
11	36	MS20470AD3-4	RIVET
12	10	MS20470AD3-5	RIVET
13	4	MS20426AD4-4	RIVET

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SUBJECT TO AMENDMENT
WITHOUT NOTICE
WORK ORDER NO. 133087 MJS
1505-26

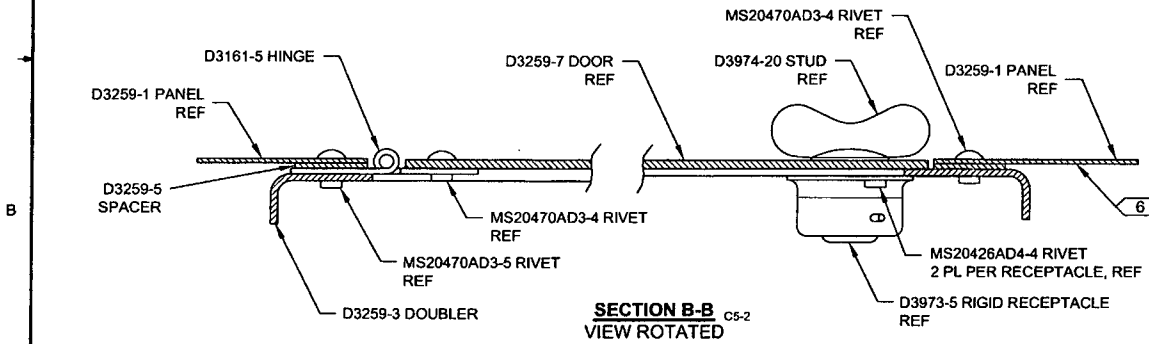
RELEASED
2009-10-08

B	REFORMAT DWG, R0.25 WAS R0.18 (ZN B8-4, B1-5)	CP	09.08.12
A	3F REDESIGN (SHT 6), WIDEN SLOTS (ZN D6-1, D5-2)	CP	04.02.25
REV.	NEW ISSUE	BY	DATE
DESIGN	RF	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN			
CHECKED		DRAWING NO.	REV. B
MFG. APPR.		D3259	SHEET 1 OF 8
APPROVED		TITLE	SCALE
DE APPR.		ACCESS PANEL ASSEMBLY	NTS
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8 7 6 5 4 3 2 1



ITEM	QTY	PART NUMBER	DESCRIPTION
1	X	D3259-042	ACCESS PANEL ASSEMBLY
2	1	D3161-5	HINGE
3	1	D3259-1	PANEL
4	1	D3259-4	DOUBLER
5	1	D3259-5	SPACER
6	1	D3259-7	DOOR
7	2	D3260-1	SPRING
8	2	D3972-5	GROMMET, HALF
9	2	D3973-5	RECEPTACLE, RIGID, DZUS
10	2	D3974-20	STUD, WING HEAD, 5/16 DZUS
11	36	MS20470AD3-4	RIVET
12	10	MS20470AD3-5	RIVET
13	4	MS20426AD4-4	RIVET



D3259-042 ACCESS PANEL ASSEMBLY

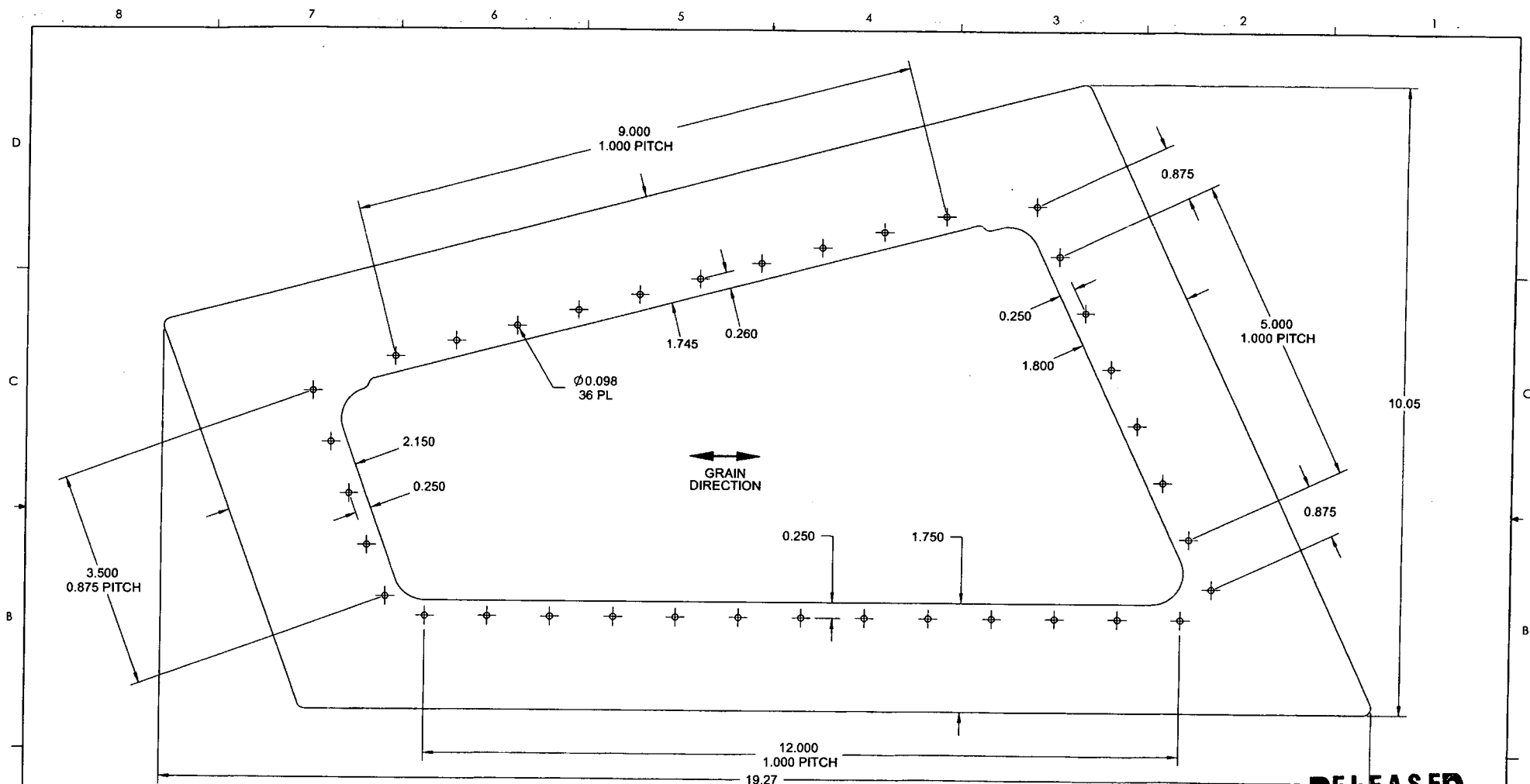
NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: NONE
- 6) IDENTIFICATION: IDENTIFY WITH P/N "D3259-042" AND B/N "BXXXXX" USING FINE POINT PERMANENT MARKER
- 7) WEIGHT: 1.2 lbs

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DESIGN	RF	DART AEROSPACE LTD
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CHECKED		DRAWING NO. REV. B
MFG. APPR.		D3259 SHEET 2 OF 8
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8 7 6 5 4 3 2 1



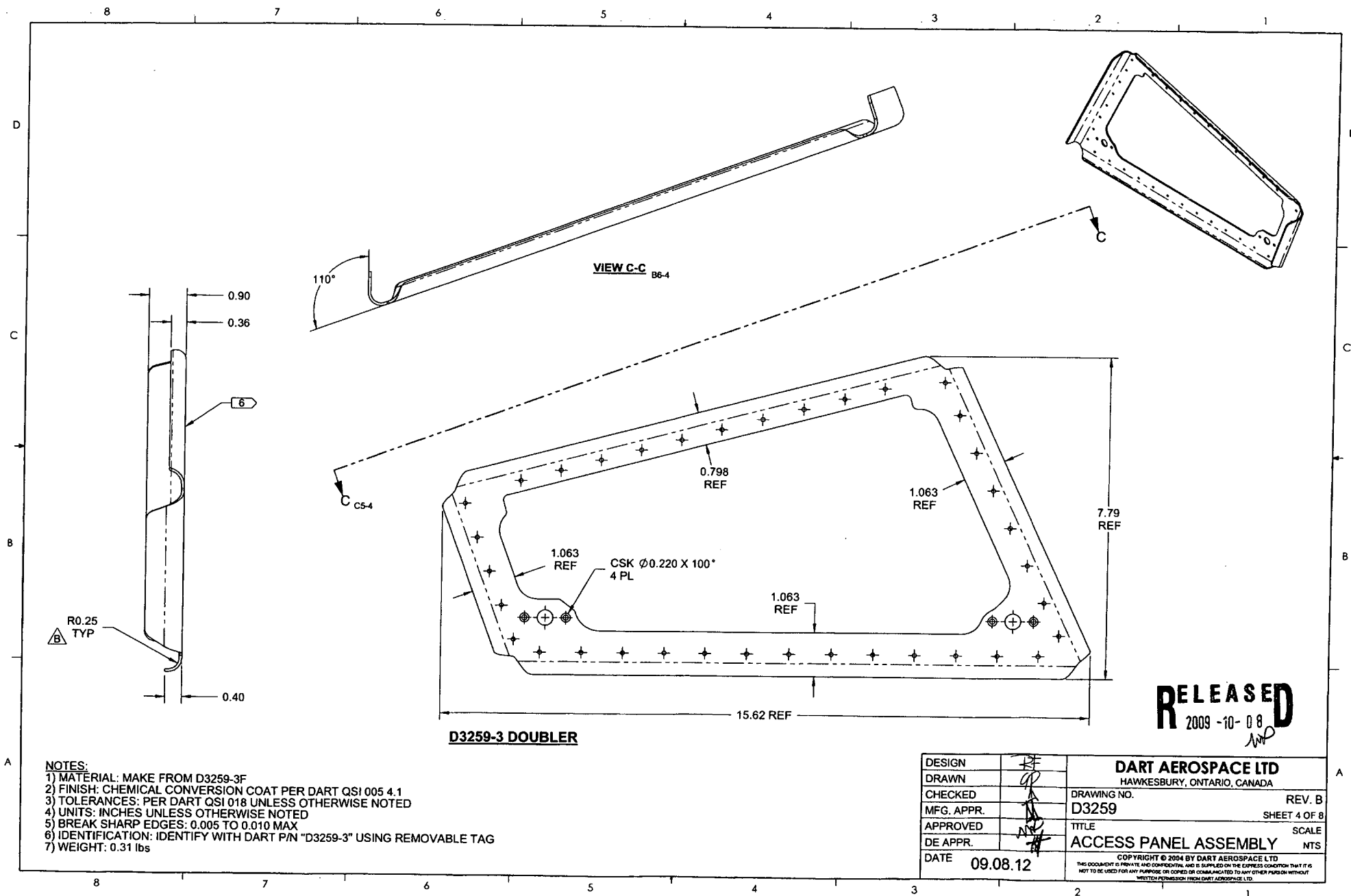
D3259-1 PANEL

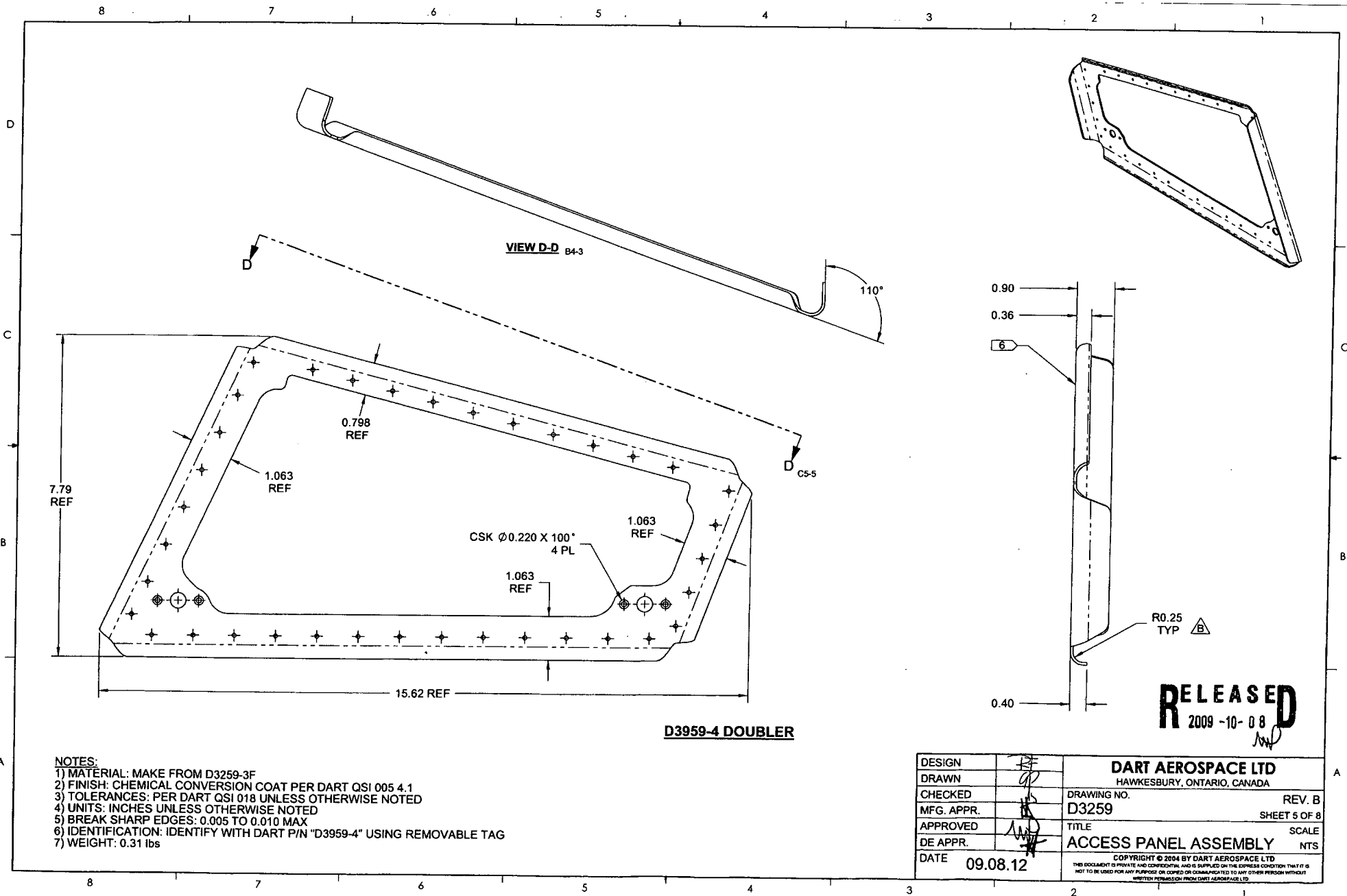
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NOTES:

- 1) MATERIAL: 2024-T3 ALUMINUM SHEET 0.032 THICK PER AMS-QQ-A-250/4 OR AMS 4037 OR ASTM B209
REF DART SPEC. M2024T3S.032
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3259-1" USING REMOVABLE TAG
- 7) WEIGHT: 0.25 lbs
- 8) MAKE PER DWG FILE "D3259-1B.DXF"

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MFG. APPR.		D3259	SHEET 3 OF 8
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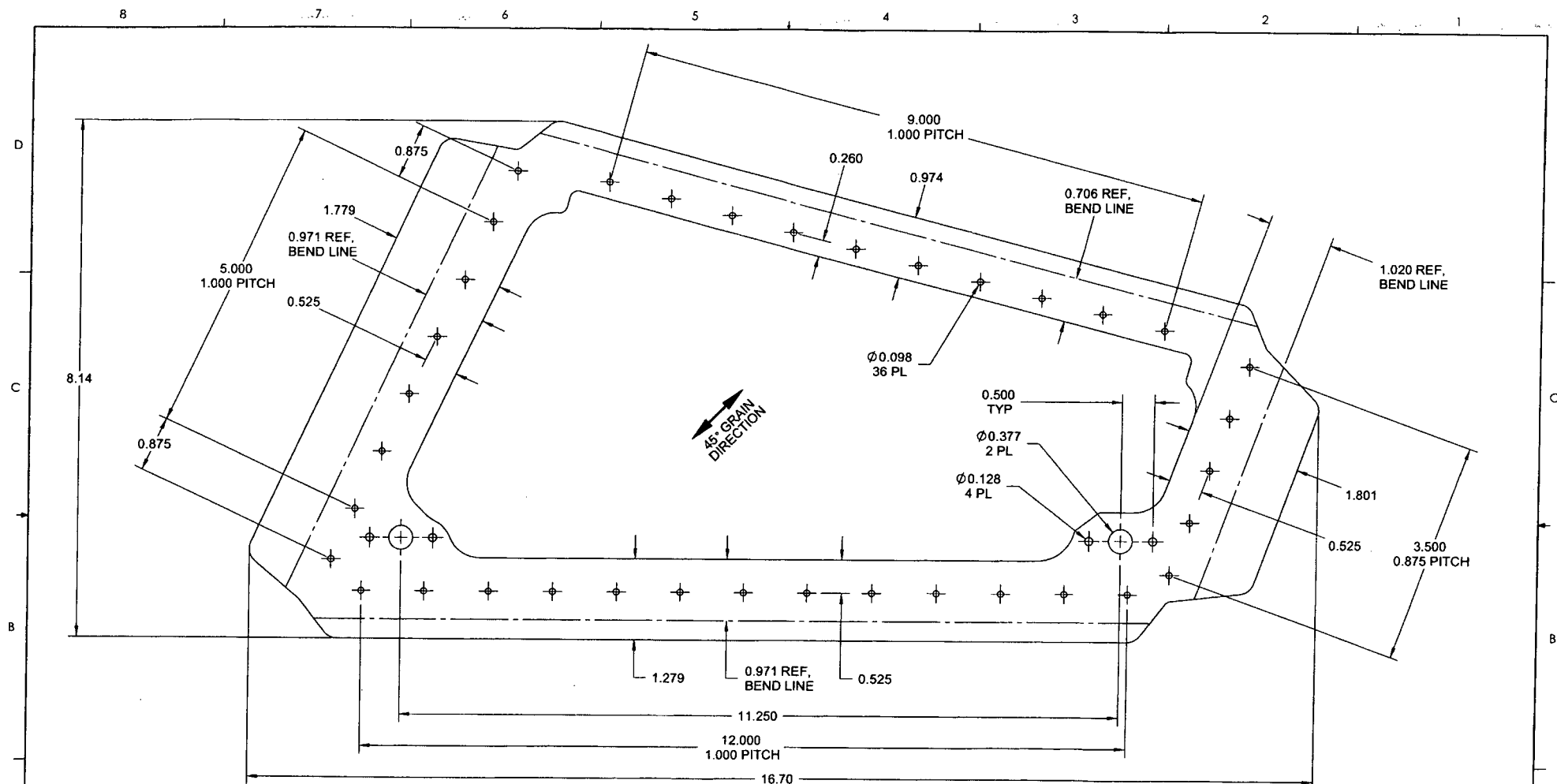




NOTES:

- 1) MATERIAL: MAKE FROM D3259-3F
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3959-4" USING REMOVABLE TAG
- 7) WEIGHT: 0.31 lbs

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MFG. APPR.		D3259	SHEET 5 OF 8
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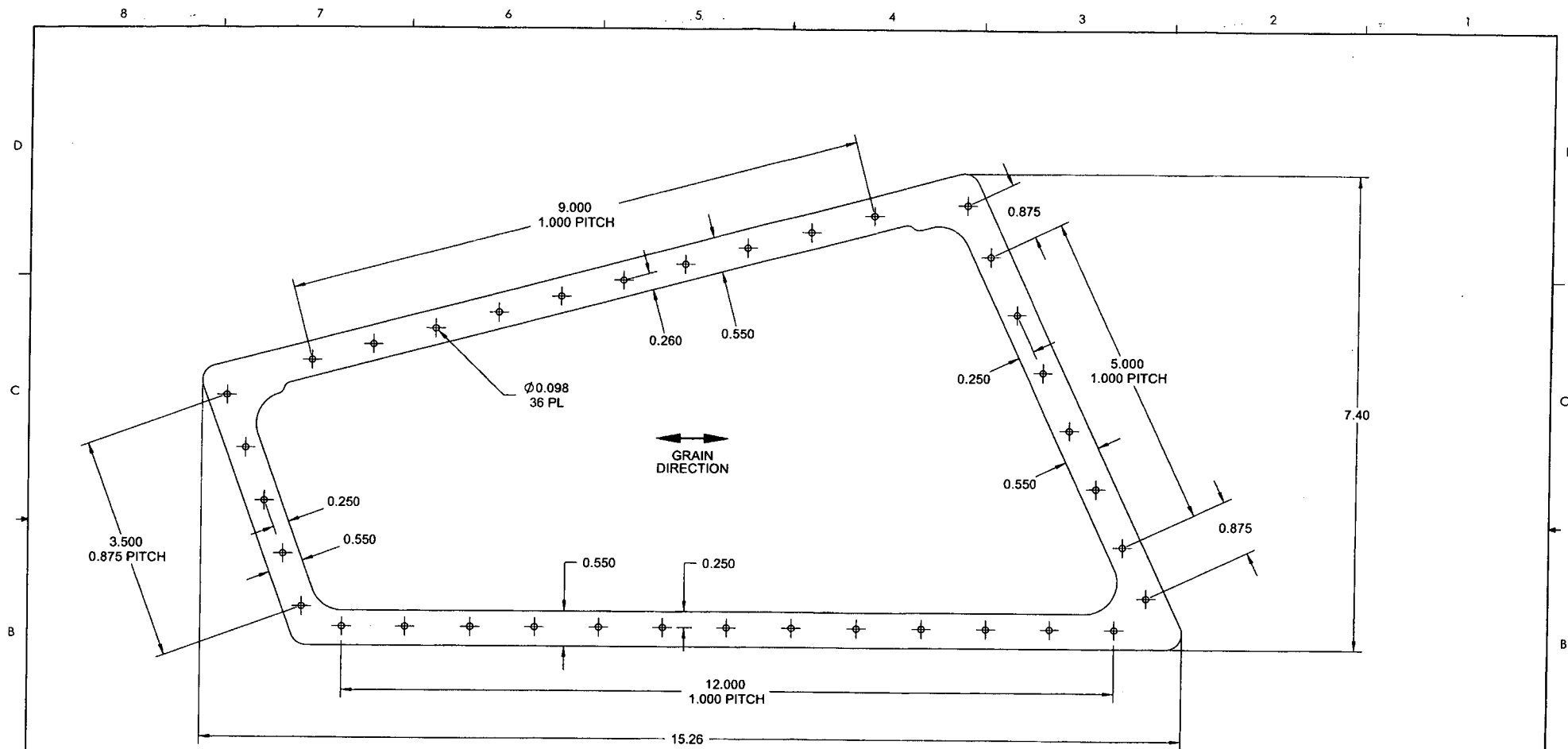
D3259-3F DOUBLER

NOTES:

- 1) MATERIAL: 2024-T3 ALUMINUM SHEET 0.063 THICK PER AMS-QQ-A-250/4 OR AMS 4037 OR ASTM B209
REF DART SPEC. M2024T3S.063
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3259-3F" USING REMOVABLE TAG
- 7) WEIGHT: 0.31 lbs
- 8) MAKE PER DWG FILE "D3259-3FB.DXF"

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MFG. APPR.			SHEET 6 OF 8
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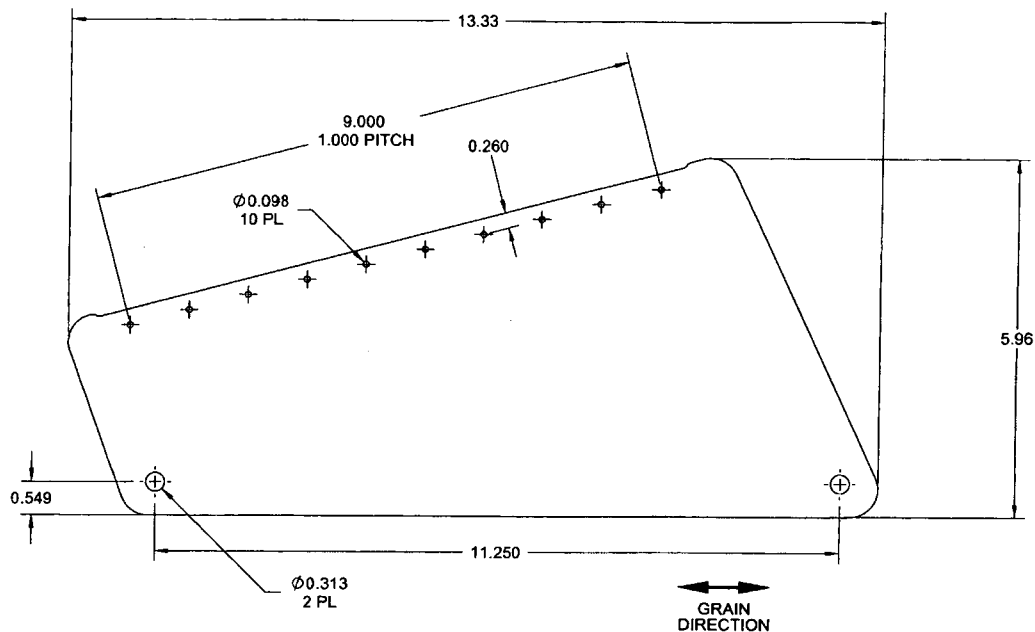
D3259-5 SPACER

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NOTES:

- 1) MATERIAL: 2024-T3 ALUMINUM SHEET 0.032 THICK PER AMS-QQ-A-250/4 OR AMS 4037 OR ASTM B209
REF DART SPEC. M2024T3S.032
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3259-5" USING REMOVABLE TAG
- 7) WEIGHT: 0.07 lbs
- 8) MAKE PER DWG FILE "D3259-5B.DXF"

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D3259-7 DOOR

NOTES:

- 1) MATERIAL: 2024-T3 ALUMINUM SHEET 0.063 THICK PER AMS-QQ-A-250/4 OR AMS 4037 OR ASTM B209
REF DART SPEC. M2024T3S.063
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3259-7" USING REMOVABLE TAG
- 7) WEIGHT: 0.35 lbs
- 8) MAKE PER DWG FILE "D3259-7B.DXF"

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